

LSLED480W Power Supply



With universal input voltage ranging from 120-277V, this 480W 50/60 Hz power supply has a 24V, 30V and 48 V DC output. Designed for wall mount installations, this power supply has an IP67 protection rating and should be installed in a dry environment.

Features Include:

- Constant voltage
- Metal housing with class design
- Built-in active PFC function
- Class 2 power unit
- IP67 protection rating
- Typical lifetime > 62,000 hours
- 7-year warranty



Output

DC Voltage	24V	30V	48V
Rated Current	20A	16A	10A
Ripple & Noise	200mVp-p	200mVp-p	250mVp-p
Voltage Tolerance ³	±1.0%	±1.0%	±1.0%
Line Regulation	±0.5%	±0.5%	±0.5%
Load Regulation	±0.5%	±0.5%	±0.5%
Setup, Rise Time ⁶	500ms, 80ms 115VAC/230VAC		
Hold Up Time (Typical)	16ms 115VAC/230VAC 16ms 115VAC/230VAC		

Input

DC Voltage	24V	30V	48V
Voltage Range ⁵	90 ~ 305 V AC 127 ~ 431VDC		
Frequency Range	47 ~ 63Hz		
Power Factor (Typ.)	PF≥0.98/115VAC, PF≥0.97/230VAC, PF≥0.95/277VAC @ full load		
Total Harmonic Distortion	THD< 20% (@ load≥40% / 115VAC,230VAC,277VAC)		
Efficiency (Typ.)	230VAC	94%	94.5%
	277VAC	94.5%	95%
AC Current (Typ.)	5A / 115VAC 2.45A / 230VAC 2A / 277VAC		
Inrush Current (Typ.)	COLD START 35A(twidth=1800 s measured at 50% Ipeak) at 230VAC; Per NEMA 410		
Maximum Number of PSUs on 16A Circuit Breaker	2unit(circuit breaker of type B) / 3units(circuit breaker of type C) at 230VAC		
Leakage Current	<0.75mA / 277VAC		

Protection

DC Voltage	24V	30V	48V
Over Current	95 ~ 108%		
Short Circuit	Constant current limiting, recovers automatically after fault condition is removed		
Over Voltage	27 ~ 33V	33 ~ 40V	53 ~ 63V
Over Temperature	Shut down output voltage, re-power on to recovery		

Environment

Working Temperature	Tcase = -40~ +90°C (Refer to Output Load vs. Temperature section)
Max Case Temperature	Tcase = +90°C
Working Humidity	20~95% RH non-condensing
Storage Temperature Humidity	-40 ~ +80°C, 10 ~ 95% RH non-condensing
Temperature Co-efficient	±0.02%/°C(0 ~ 60°C)
Vibration	10 ~ 500Hz, 5G 12min./1cycle, period for 72min. each along X, Y, Z axes

Safety & EMC

Safety Standards⁸	UL8750(type"HL"), CSA C22.2 No. 250.13-12; ENEC BS EN/EN61347-1, BS EN/EN61347-2-13 independent, BS EN/EN62384; GB19510.14,GB19510.1;IP65 or IP67 EAC TP TC 004,,AS/NZS IEC 61347.2.13:2013,AS/NZS 61347.1:2016;KC61347 1-, KC61347 2--13(except for AB,Dx type), J61347-1(H29), J61347-2-13(H29)(except for Dx type) approved
Withstand Voltage	I/P-O/P:3.75KVAC I/P-FG:2KVAC O/P-FG:1.5KVAC
Isolation Resistance	I/P-O/P, I/P-FG, O/P-FG:100M Ohms / 500VDC / 25°C/ 70% RH
EMC Emission⁸	Compliance to BS EN/EN55015, BS EN/EN61000-3-2 Class C (@ load≥50%); BS EN/EN61000-3-3;GB/T 17743, GB17625.1, EAC TP TC 020;KC KN15,KN61547(except for AB,Dx type),J55015(H29)(for Blank/A-type)
EMC Immunity	Compliance to BS EN/EN61000-4-2,3,4,5,6,8,11, BS EN/EN61547, light industry level (surge immunity Line-Earth 4KV, Line-Line 2KV), EAC TP TC 020;KC KN15,KN61547(except for AB,Dx type),J55015(H29)(for Blank/A-type)

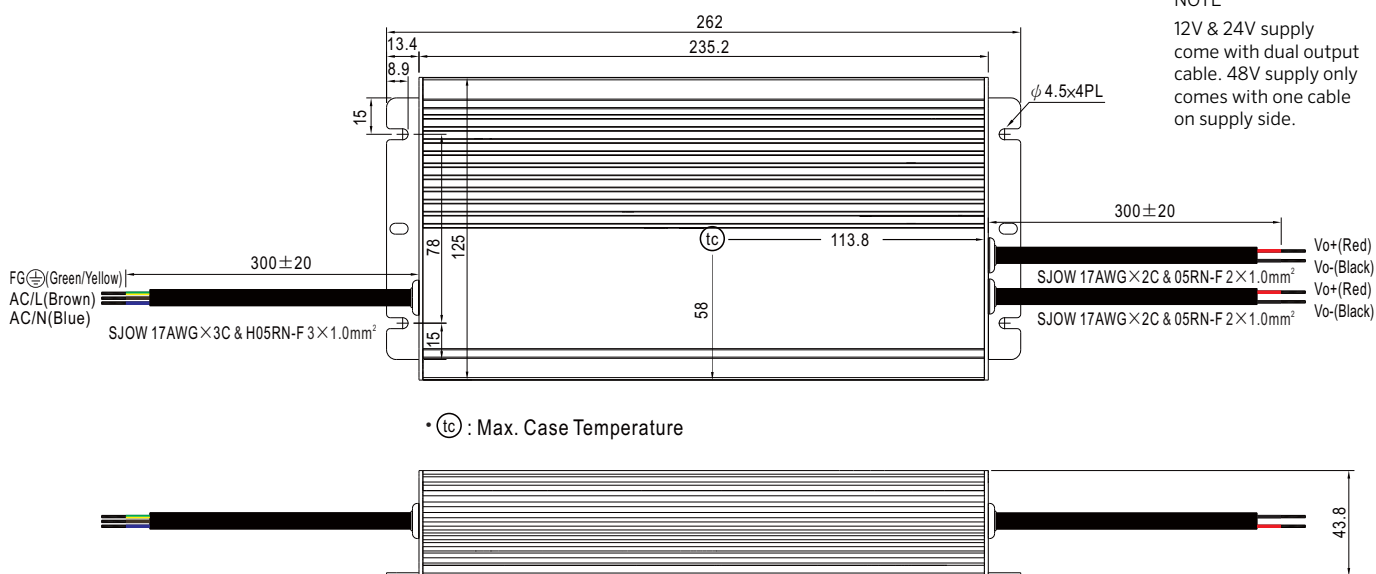
Others

MTBF	1185.9K hrs min. Telcordia SR-332(Bellcore) ; 95.4K hrs min. MIL-HDBK-217F (25°C)
Dimension	262mm x 125mm x 43.8m (LxWxH)
Packing	2.8Kg;4pcs/12.2Kg/0.55CUFT

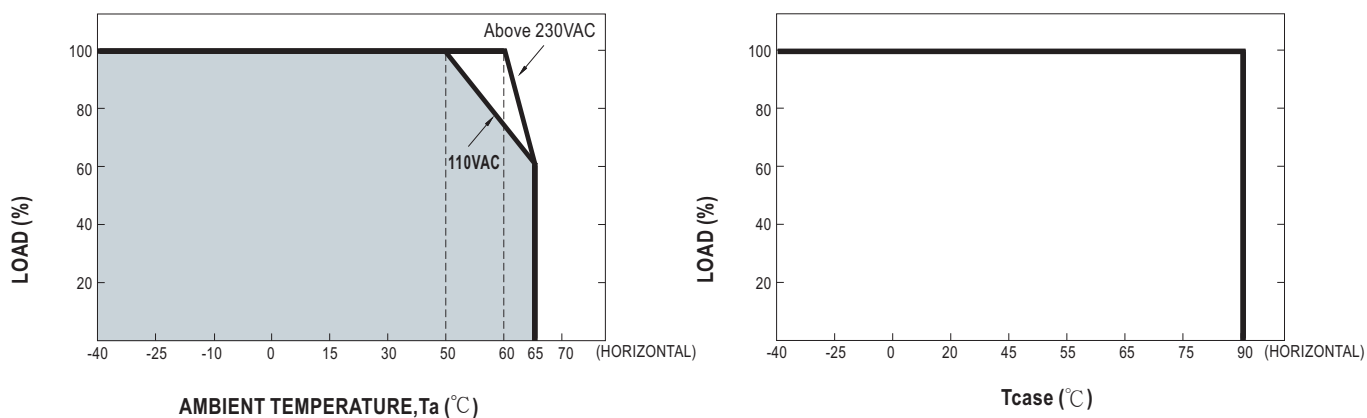
Notes

1. All parameters NOT specifically mentioned are measured at 230 V AC input, rated current and 25°C of ambient temperature.
2. Ripple & noise are measured at 20 MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf & 47uf parallel capacitor.
3. Tolerance: includes set up tolerance, line regulation and load regulation.
4. Please refer to "DRIVING METHODS OF LED MODULE"
5. De-rating may be needed under low input voltages. Please refer to "STATIC CHARACTERISTIC" section for details.
6. Length of set up time is measured at first cold start. Turning ON/OFF the driver may lead to increase of the set up time.
7. The driver is considered as a component that will be operated in combination with final equipment. Since EMC performance will be affected by the complete installation, the final equipment manufacturers must re-qualify EMC Directive on the complete installation again.
8. To fulfill requirements of the latest ErP regulation for lighting fixtures, this LED driver can only be used behind a switch without permanently connected to the mains.
9. This series meets the typical life expectancy of >62,000 hours of operation when Tcase, particularly tc point (or TMP, per DLC), is about 75°C or less.
10. Please refer to the warranty statement on MEANWELL's website at: <http://www.meanwell.com>
11. The ambient temperature derating of 3.5°C/1000m with fanless models and of 5°C/1000m with fan models for operating altitude higher than 2000m (6500 ft).
12. For any application note and IP water proof function installation caution, please refer to user manual before using: https://www.meanwell.com/Upload/PDF/LED_EN.pdf

Technical Drawings



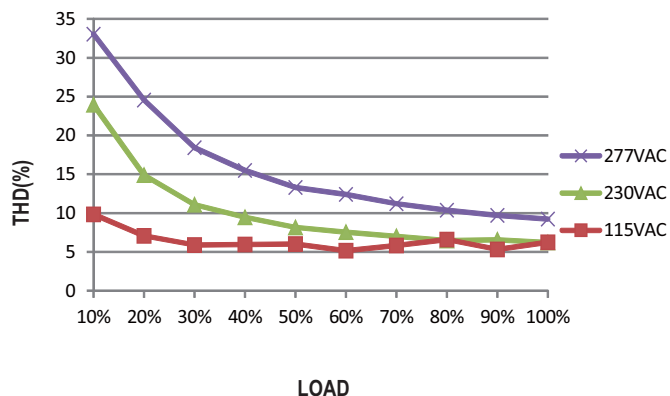
Output Load vs. Temperature



© If HLG-480H operates in constant current mode with the rated current, the maximum workable T_a is 60°C. (Typ. 230VAC)

Total Harmonic Distortion (THD)

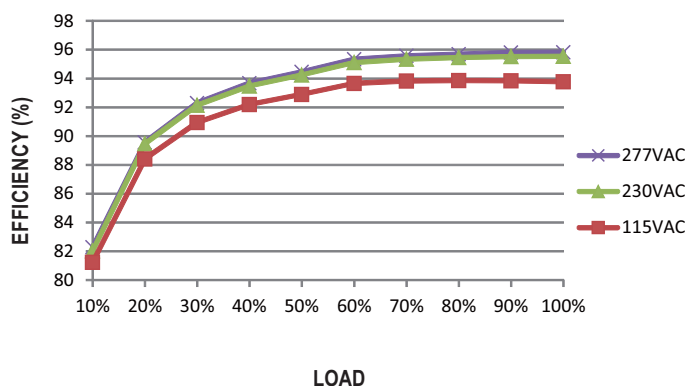
※ 42V Model, Tcase at 75°C



Efficiency vs. Load

HLG-480H series possess superior working efficiency that up to 95.5% can be reached in field applications.

※ 42V Model, Tcase at 75°C



Lifetime

